

**STATIC MEASUREMENT AND DETECTION IN A GAS PHASE
POLYETHYLENE REACTOR**

ABSTRACT

The invention relates to a method for evaluating the condition of a fluidized bed reactor by examining the condition of the reactor wall. Specifically, the invention relates to a method for measuring static in the reactor using a static probe that is located at the distributor plate and comprises a distributor plate cap. The invention also relates to methods of determining a static level using a radio frequency (rf). The static measurements are provided to indicate or predict major continuity disturbances in the fluidized bed gas phase reactor.